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**Petroleum and natural gas industries - Corrosion-resistant alloy seamless tubes for use as casing, tubing and coupling stock - Technical delivery conditions (ISO 13680:2000)**

Petroleum and natural gas industries - Corrosion-resistant alloy seamless tubes for use as casing, tubing and coupling stock - Technical delivery conditions (ISO 13680:2000)

Erdöl- und Erdgasindustrie - Nahtlose Rohre aus korrosionsbeständigen Legierungen zur Verwendung als Futter- oder Steigrohre sowie Muffenvorrohre - Technische Lieferbedingungen (ISO 13680:2000)

Industries du pétrole et du gaz naturel - Tubes sans soudure en acier allié résistant à la corrosion utilisés comme tubes de cuvelage, tubes de production et tubes-ébauches pour manchons - Conditions techniques de livraison (ISO 13680:2000)

**Ta slovenski standard je istoveten z: EN ISO 13680:2001**

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**ICS:**

75.180.10	Oprema za raziskovanje in odkopavanje	Exploratory and extraction equipment
77.140.75	Jeklene cevi in cevni profili za posebne namene	Steel pipes and tubes for specific use

**SIST EN ISO 13680:2004****en**

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EUROPEAN STANDARD  
NORME EUROPÉENNE  
EUROPÄISCHE NORM

**EN ISO 13680**

November 2001

ICS 75.180.10; 77.140.75

English version

**Petroleum and natural gas industries - Corrosion-resistant alloy  
seamless tubes for use as casing, tubing and coupling stock -  
Technical delivery conditions (ISO 13680:2000)**

Industries du pétrole et du gaz naturel - Tubes sans  
soudure en acier allié résistant à la corrosion utilisés  
comme tubes de cuvelage, tubes de production et tubes-  
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korrosionsbeständigen Legierungen zur Verwendung als  
Futter- oder Steigrohre sowie Muffenvorrohre - Technische  
Lieferbedingungen (ISO 13680:2000)

This European Standard was approved by CEN on 9 June 2001.

CEN members are bound to comply with the CEN/CENELEC Internal Regulations which stipulate the conditions for giving this European Standard the status of a national standard without any alteration. Up-to-date lists and bibliographical references concerning such national standards may be obtained on application to the Management Centre or to any CEN member.

This European Standard exists in three official versions (English, French, German). A version in any other language made by translation under the responsibility of a CEN member into its own language and notified to the Management Centre has the same status as the official versions.

CEN members are the national standards bodies of Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and United Kingdom.



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COMITÉ EUROPÉEN DE NORMALISATION  
EUROPÄISCHES KOMITEE FÜR NORMUNG

**Management Centre: rue de Stassart, 36 B-1050 Brussels**

**EN ISO 13680:2001 (E)****Foreword**

The text of the International Standard from Technical Committee ISO/TC 67 "Materials, equipment and offshore structures for petroleum and natural gas industries" of the International Organization for Standardization (ISO) has been taken over as an European Standard by Technical Committee CEN/TC 12 "Materials, equipment and offshore structures for petroleum and natural gas industries", the secretariat of which is held by AFNOR.

This European Standard shall be given the status of a national standard, either by publication of an identical text or by endorsement, at the latest by May 2002, and conflicting national standards shall be withdrawn at the latest by May 2002.

According to the CEN/CENELEC Internal Regulations, the national standards organizations of the following countries are bound to implement this European Standard: Austria, Belgium, Czech Republic, Denmark, Finland, France, Germany, Greece, Iceland, Ireland, Italy, Luxembourg, Netherlands, Norway, Portugal, Spain, Sweden, Switzerland and the United Kingdom.

**Endorsement notice**

The text of the International Standard ISO 13680:2000 has been approved by CEN as a European Standard without any modification.

NOTE: Normative references to International Standards are listed in annex ZA (normative).

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**Annex ZA (normative)**  
**Normative references to international publications**  
**with their relevant European publications**

This European Standard incorporates by dated or undated reference, provisions from other publications. These normative references are cited at the appropriate places in the text and the publications are listed hereafter. For dated references, subsequent amendments to or revisions of any of these publications apply to this European Standard only when incorporated in it by amendment or revision. For undated references the latest edition of the publication referred to applies (including amendments).

NOTE Where an International Publication has been modified by common modifications, indicated by (mod.), the relevant EN/HD applies.

<u>Publication</u>	<u>Year</u>	<u>Title</u>	<u>EN</u>	<u>Year</u>
ISO 377	1997	Steel and steel products - Location and preparation of samples and test pieces for mechanical testing	EN ISO 377	1997
ISO 6508-1	1999	Metallic materials - Rockwell hardness test - Part 1: Test method (scales A, B, C, D, E, F, G, H, K, N, T)	EN ISO 6508-1	1999
ISO 7539-1	1987	Corrosion of metals and alloys - Stress corrosion testing - Part 1: General guidance on testing procedures	EN ISO 7539-1	1995
ISO 7539-2	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 2: Preparation and use of bent-beam specimen	EN ISO 7539-2	1995
ISO 7539-3	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 3: Preparation and use of U-bend specimens	EN ISO 7539-3	1995
ISO 7539-4	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 4: Preparation and use of uniaxially loaded tension specimens	EN ISO 7539-4	1995
ISO 7539-5	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 5: Preparation and use of C-ring specimens	EN ISO 7539-5	1995
ISO 7539-6	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 6: Preparation and use of pre-cracked specimens	EN ISO 7539-6	1995
ISO 7539-7	1989	Corrosion of metals and alloys - Stress corrosion testing - Part 7: Slow strain rate testing	EN ISO 7539-7	1995
ISO 11960	1996	Petroleum and natural gas industries - Steel pipes for use as casing or tubing for wells	EN ISO 11960	1998

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**13680**

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## **Petroleum and natural gas industries — Corrosion-resistant alloy seamless tubes for use as casing, tubing and coupling stock — Technical delivery conditions**

*Industries du pétrole et du gaz naturel — Tubes sans soudure en acier allié  
résistant à la corrosion utilisés comme tubes de cuvelage, tubes de  
production et tubes-ébauches pour manchons — Conditions techniques de  
livraison*

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## Foreword

ISO (the International Organization for Standardization) is a worldwide federation of national standards bodies (ISO member bodies). The work of preparing International Standards is normally carried out through ISO technical committees. Each member body interested in a subject for which a technical committee has been established has the right to be represented on that committee. International organizations, governmental and non-governmental, in liaison with ISO, also take part in the work. ISO collaborates closely with the International Electrotechnical Commission (IEC) on all matters of electrotechnical standardization.

International Standards are drafted in accordance with the rules given in the ISO/IEC Directives, Part 3.

Draft International Standards adopted by the technical committees are circulated to the member bodies for voting. Publication as an International Standard requires approval by at least 75 % of the member bodies casting a vote.

Attention is drawn to the possibility that some of the elements of this International Standard may be the subject of patent rights. ISO shall not be held responsible for identifying any or all such patent rights.

International Standard ISO 13680 was prepared by Technical Committee ISO/TC 67, *Materials, equipment and offshore structures for petroleum and natural gas industries*, Subcommittee SC 5, *Casing, tubing and drill pipe*.

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# Petroleum and natural gas industries — Corrosion-resistant alloy seamless tubes for use as casing, tubing and coupling stock — Technical delivery conditions

## 1 Scope

This International Standard specifies the technical delivery conditions for corrosion-resistant alloy seamless tubes for casing, tubing and coupling stock.

This International Standard is applicable to the following four groups of tube product:

- **Group 1**, comprised of stainless alloy with a martensitic or martensitic/ferritic structure;
- **Group 2**, comprised of stainless alloy with a ferritic-austenitic structure, such as duplex and super duplex stainless alloy;
- **Group 3**, comprised of stainless alloy with an austenitic structure (iron base);
- **Group 4**, comprised of nickel-based alloys with an austenitic structure (nickel base).

This International Standard contains no provisions relating to the connection or other methods by which individual lengths of tube are joined to form a string.

NOTE The connection or joining method can influence the corrosion performance of the materials specified in this International Standard.

## 2 Normative references

The following normative documents contain provisions which, through reference in this text, constitute provisions of this International Standard. For dated references, subsequent amendments to, or revisions of, any of these publications do not apply. However, parties to agreements based on this International Standard are encouraged to investigate the possibility of applying the most recent editions of the normative documents indicated below. For undated references, the latest edition of the normative document referred to applies. Members of ISO and IEC maintain registers of currently valid International Standards.

ISO 148, *Steel — Charpy impact test (V-notch)*.

ISO 377, *Steel and steel products — Location and preparation of samples and test pieces for mechanical testing*.

ISO 404, *Steel and steel products — General technical delivery requirements*.

ISO 643, *Steels — Micrographic determination of the ferritic or austenitic grain size*.

ISO 783, *Metallic materials — Tensile testing at elevated temperature*.

ISO 3545-1, *Steel tubes and fittings — Symbols for use in specifications — Part 1: Tubes and tubular accessories with circular cross-section*.